

**IN THE CLAIMS****CLAIM 1. (currently and previously amended)**

A disinfection and purification composition for producing potable fluids, comprising consisting essentially of:

(a) at least one metal selected from the group consisting of the metals in the Periodic Table of the Elements, groups 1b,2b,3b,4b,5b,6b,7b,8,3a,4a, and 5a wherein the concentration of any one of the selected metals shall not exceed 0.75 milligrams per liter when the disinfection and purification composition is dissolved in a fluid to be produced as the potable fluid;

(b) at least one plant extract wherein the concentration of any one of the plant extracts shall not exceed 110 milligrams per liter when the disinfection and purification composition is dissolved in a fluid to be produced as the potable fluid or chemical equivalent thereof; and

(c) at least one alcohol wherein the concentration of any one of the alcohols shall not exceed 220 milligrams per liter when the disinfection and purification composition is dissolved in a fluid to be produced as the potable fluid.

**CLAIM 2. (currently and previously amended)**

A disinfection and purification composition for producing potable fluids, comprising consisting essentially of:

(a) at least one metal selected from the group consisting of the metals in the Periodic Table of the Elements, groups 1b,2b,3b,4b,5b,6b,7b,8,3a,4a, and 5a wherein the concentration of any one of the selected metals shall not exceed 0.75 milligrams per liter when the disinfection and purification composition is dissolved in a fluid to be produced as the potable fluid; and

(b) at least one plant extract wherein the concentration of any one of the plant extracts shall not exceed 110 milligrams per liter when the disinfection and purification composition is dissolved in a fluid to be produced as the potable fluid or chemical equivalent thereof.

**CLAIM 3. (currently and previously amended)**

A disinfection and purification composition for producing potable fluids, comprising consisting essentially of:

(a) at least one metal selected from the group consisting of the metals in the Periodic Table of the Elements, groups 1b,2b,3b,4b,5b,6b,7b,8,3a,4a, and 5a wherein the concentration of any one of the selected metals shall not exceed 0.75 milligrams per liter when the disinfection and purification composition is dissolved in a fluid to be produced as the potable fluid;

and

(b) at least one alcohol wherein the concentration of any one of the alcohols shall not exceed 220 milligrams per liter when the disinfection and purification composition is dissolved in a fluid to be produced as the potable fluid.

CLAIM 4. (currently amended) The disinfection and purification composition for producing potable fluids of CLAIM 1 wherein at least one of the metals selected is copper.

CLAIM 5. (currently amended) The disinfection and purification composition for producing potable fluids of CLAIM 1 wherein at least one of the metals selected is silver.

CLAIM 6. (currently amended) The disinfection and purification composition for producing potable fluids of CLAIM 2 wherein at least one of the metals selected is copper.

CLAIM 7. (currently amended) The disinfection and purification composition for producing potable fluids of CLAIM 2 wherein at least one of the metals selected is silver.

CLAIM 8. (currently amended) The disinfection and purification composition for producing potable fluids of CLAIM 3 wherein at least one of the metals selected is copper.

CLAIM 9. (currently amended) The disinfection and purification composition for producing potable fluids of CLAIM 3 wherein at least one of the metals selected is silver.

CLAIM 10. (currently amended) The disinfection and purification composition for producing potable fluids of CLAIM 1 wherein the metals selected are copper and silver.

CLAIM 11. (currently amended) The disinfection and purification composition for producing potable fluids of CLAIM 2 wherein the metals selected are copper and silver.

CLAIM 12. (currently amended) The disinfection and purification composition for producing potable fluids of CLAIM 3 wherein the metals selected are copper and silver.

CLAIM 13. (currently and previously amended) The disinfection and purification composition for producing potable fluids of CLAIM 1 wherein the plant extracts ~~or chemical equivalents thereof~~ are selected from the group consisting of citrus fruits angiosperms or chemical equivalents thereof.

CLAIM 14. (currently amended) The disinfection and purification composition for producing potable fluids of CLAIM 1 wherein the alcohol is glycerol.

CLAIM 15. (currently and previously amended) The disinfection and purification composition for producing potable fluids of CLAIM 2 wherein the plant extracts ~~or chemical equivalents thereof~~ are selected from the group consisting of citrus fruits angiosperms or chemical

equivalents thereof.

**CLAIM 16.** (currently amended) The disinfection and purification composition for producing potable fluids of **CLAIM 3** wherein the alcohol is glycerol.

**CLAIM 17.** (currently and previously amended) The disinfection and purification composition for producing potable fluids of **CLAIM 1** wherein the plant extract is extracted from grapefruit or chemical equivalent thereof.

**CLAIM 18.** (currently and previously amended) The disinfection and purification composition for producing potable fluids of **CLAIM 2** wherein the plant extract is extracted from grapefruit or chemical equivalent thereof.

**CLAIM 19.** (currently and previously amended) A method of manufacturing the disinfection and purification composition for producing potable fluids of **CLAIM 1** comprising consisting essentially of the steps of:

selecting at least one of the metals from the group consisting of the metals in the Periodic Table of the Elements, groups 1b,2b,3b,4b,5b,6b,7b,8,3a,4a, and 5a;

selecting the plant extract or chemical equivalent thereof;

selecting the alcohol; and

mixing the selected metals together with the selected plant extract or chemical equivalent thereof and the selected alcohol.

**CLAIM 20.** (currently and previously amended) A method of manufacturing the disinfection and purification composition for producing potable fluids of **CLAIM 2** comprising consisting essentially of the steps of:

selecting at least one of the metals from the group consisting of the metals in the Periodic Table of the Elements, groups 1b,2b,3b,4b,5b,6b,7b,8,3a,4a, and 5a;

selecting the plant extract or chemical equivalent thereof; and

mixing the selected metals together with the selected plant extract or chemical equivalent thereof.

**CLAIM 21.** (currently and previously amended) A method of manufacturing the disinfection and purification composition for producing potable fluids of **CLAIM 3** comprising consisting essentially of the steps of:

selecting at least one of the metals from the group consisting of the metals in the Periodic Table of the Elements, groups 1b,2b,3b,4b,5b,6b,7b,8,3a,4a, and 5a;

selecting the alcohol; and

mixing the selected metals together with the selected alcohol.

**CLAIM 22.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of CLAIM 19 comprising consisting essentially of the steps of:

infusing the mixture into a user selected item.

**CLAIM 23.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of CLAIM 19 comprising consisting essentially of the steps of:

applying the mixture onto the surface of a user selected item.

**CLAIM 24.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of CLAIM 19 comprising consisting essentially of the steps of:

dissolving the mixture into a user selected liquid.

**CLAIM 25.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of CLAIM 20 comprising consisting essentially of the steps of:

infusing the mixture into a user selected item.

**CLAIM 26.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of CLAIM 20 comprising consisting essentially of the steps of:

applying the mixture onto the surface of a user selected item.

**CLAIM 27.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of CLAIM 20 comprising consisting essentially of the steps of:

dissolving the mixture into a user selected liquid.

**CLAIM 28.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of CLAIM 21 comprising consisting essentially of the steps of:

infusing the mixture into a user selected item.

**CLAIM 29.** (currently and previously amended) A method of using the disinfection and

purification composition for producing potable fluids manufactured by the method of manufacture of CLAIM 21 comprising consisting essentially of the steps of:

applying the mixture onto the surface of a user selected item.

**CLAIM 30.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of CLAIM 21 comprising consisting essentially of the steps of:

dissolving the mixture into a user selected liquid.

**CLAIM 31.** (currently and previously amended) A method of manufacturing the disinfection and purification composition for producing potable fluids of CLAIM 1 comprising consisting essentially of the steps of:

selecting at least one of the metals from the group consisting of the metals in the Periodic Table of the Elements, groups 1b,2b,3b,4b,5b,6b,7b,8,3a,4a, and 5a;

selecting the plant extract or chemical equivalent thereof;

selecting the alcohol;

selecting at least one disinfectant compound from the group consisting of ozone, peroxides, halogens from the Periodic Table of the Elements, group 7a, halogenated hydrocarbons, amides, amines, and halogenated dioxides; and

mixing the selected metals together with the selected plant extract or chemical equivalent thereof the selected alcohol and the selected disinfectant compounds.

**CLAIM 32.** (currently and previously amended) A method of manufacturing the disinfection and purification composition for producing potable fluids of CLAIM 2 comprising consisting essentially of the steps of:

selecting at least one of the metals from the group consisting of the metals in the Periodic Table of the Elements, groups 1b,2b,3b,4b,5b,6b,7b,8,3a,4a, and 5a;

selecting the plant extract or chemical equivalent thereof;

selecting at least one disinfectant compound from the group consisting of ozone, peroxides, halogens from the Periodic Table of the Elements, group 7a, halogenated hydrocarbons, amides, amines, and halogenated dioxides; and

mixing the selected metals together with the selected plant extract or chemical equivalent thereof and the selected disinfectant compounds.

**CLAIM 33.** (currently and previously amended) A method of manufacturing the

disinfection and purification composition for producing potable fluids of CLAIM 3 comprising consisting essentially of the steps of:

selecting at least one of the metals from the group consisting of the metals in the Periodic Table of the Elements, groups 1b,2b,3b,4b,5b,6b,7b,8,3a,4a, and 5a;

selecting the alcohol;

selecting at least one disinfectant compound from the group consisting of ozone, peroxides, halogens from the Periodic Table of the Elements, group 7a, halogenated hydrocarbons, amides, amines, and halogenated dioxides; and

mixing the selected metals together with the selected alcohol and the selected disinfectant compounds.

**CLAIM 34.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of CLAIM 31 comprising consisting essentially of the steps of:

infusing the mixture into a user selected item.

**CLAIM 35.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of CLAIM 31 comprising consisting essentially of the steps of:

applying the mixture onto the surface of a user selected item.

**CLAIM 36.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of CLAIM 31 comprising consisting essentially of the steps of:

dissolving the mixture into a user selected liquid.

**CLAIM 37.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of CLAIM 32 comprising consisting essentially of the steps of:

infusing the mixture into a user selected item.

**CLAIM 38.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of CLAIM 32 comprising consisting essentially of the steps of:

applying the mixture onto the surface of a user selected item.

**CLAIM 39.** (currently and previously amended) A method of using the disinfection and

purification composition for producing potable fluids manufactured by the method of manufacture of CLAIM 32 comprising consisting essentially of the steps of:

dissolving the mixture into a user selected liquid.

CLAIM 40. (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of CLAIM 33 comprising consisting essentially of the steps of:

infusing the mixture into a user selected item.

CLAIM 41. (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of CLAIM 33 comprising consisting essentially of the steps of:

applying the mixture onto the surface of a user selected item.

CLAIM 42. (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of CLAIM 33 comprising consisting essentially of the steps of:

dissolving the mixture into a user selected liquid.

CLAIM 43. (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of CLAIM 19 comprising consisting essentially of the steps of:

infusing the mixture into a user selected item; and

exposing the mixture infused item to at least one treatment selected from the group consisting of radiation, light, sonic blasts and extremes of temperature.

CLAIM 44. (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of CLAIM 19 comprising consisting essentially of the steps of:

applying the mixture onto the surface of a user selected item; and

exposing the mixture applied surface to at least one treatment selected from the group consisting of radiation, light, sonic blasts and extremes of temperature.

CLAIM 45. (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of CLAIM 19 comprising consisting essentially of the steps of:

dissolving the mixture into a user selected liquid; and

exposing the liquid dissolved mixture to at least one treatment selected from the group consisting of radiation, light, sonic blasts and extremes of temperature.

**CLAIM 46.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of **CLAIM 20** comprising consisting essentially of the steps of:

infusing the mixture into a user selected item; and

exposing the mixture infused item to at least one treatment selected from the group consisting of radiation, light, sonic blasts and extremes of temperature.

**CLAIM 47.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of **CLAIM 20** comprising consisting essentially of the steps of:

applying the mixture onto the surface of a user selected item; and

exposing the mixture applied surface to at least one treatment selected from the group consisting of radiation, light, sonic blasts and extremes of temperature.

**CLAIM 48.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of **CLAIM 20** comprising consisting essentially of the steps of:

dissolving the mixture into a user selected liquid; and

exposing the liquid dissolved mixture to at least one treatment selected from the group consisting of radiation, light, sonic blasts and extremes of temperature.

**CLAIM 49.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of **CLAIM 21** comprising consisting essentially of the steps of:

infusing the mixture into a user selected item; and

exposing the mixture infused item to at least one treatment selected from the group consisting of radiation, light, sonic blasts and extremes of temperature.

**CLAIM 50.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of **CLAIM 21** comprising consisting essentially of the steps of:

applying the mixture onto the surface of a user selected item; and

exposing the mixture applied surface to at least one treatment selected from the group



consisting of radiation, light, sonic blasts and extremes of temperature.

**CLAIM 51.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of **CLAIM 21** comprising consisting essentially of the steps of:

dissolving the mixture into a user selected liquid; and

exposing the liquid dissolved mixture to at least one treatment selected from the group consisting of radiation, light, sonic blasts and extremes of temperature.

**CLAIM 52.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of **CLAIM 31** comprising consisting essentially of the steps of:

infusing the mixture into a user selected item; and

exposing the mixture infused item to at least one treatment selected from the group consisting of radiation, light, sonic blasts and extremes of temperature.

**CLAIM 53.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of **CLAIM 31** comprising consisting essentially of the steps of:

applying the mixture onto the surface of a user selected item; and

exposing the mixture applied surface to at least one treatment selected from the group consisting of radiation, light, sonic blasts and extremes of temperature.

**CLAIM 54.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of **CLAIM 31** comprising consisting essentially of the steps of:

dissolving the mixture into a user selected liquid; and

exposing the liquid dissolved mixture to at least one treatment selected from the group consisting of radiation, light, sonic blasts and extremes of temperature.

**CLAIM 55.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of **CLAIM 32** comprising consisting essentially of the steps of:

infusing the mixture into a user selected item; and

exposing the mixture infused item to at least one treatment selected from the group consisting of radiation, light, sonic blasts and extremes of temperature.

**CLAIM 56.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of **CLAIM 32** comprising consisting essentially of the steps of:

applying the mixture onto the surface of a user selected item; and  
exposing the mixture applied surface to at least one treatment selected from the group consisting of radiation, light, sonic blasts and extremes of temperature.

**CLAIM 57.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of **CLAIM 32** comprising consisting essentially of the steps of:

dissolving the mixture into a user selected liquid; and  
exposing the liquid dissolved mixture to at least one treatment selected from the group consisting of radiation, light, sonic blasts and extremes of temperature.

**CLAIM 58.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of **CLAIM 33** comprising consisting essentially of the steps of:

infusing the mixture into a user selected item; and  
exposing the mixture infused item to at least one treatment selected from the group consisting of radiation, light, sonic blasts and extremes of temperature.

**CLAIM 59.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of **CLAIM 33** comprising consisting essentially of the steps of:

applying the mixture onto the surface of a user selected item; and  
exposing the mixture applied surface to at least one treatment selected from the group consisting of radiation, light, sonic blasts and extremes of temperature.

**CLAIM 60.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of **CLAIM 33** comprising consisting essentially of the steps of:

dissolving the mixture into a user selected liquid; and  
exposing the liquid dissolved mixture to at least one treatment selected from the group consisting of radiation, light, sonic blasts and extremes of temperature.

**CLAIM 61.** (currently and previously amended) A method of using the disinfection and

purification composition for producing potable fluids manufactured by the method of manufacture of **CLAIM 19** comprising consisting essentially of the steps of:

placing the mixture in a filtration device such that a user selected fluid must pass through the filtration device and dissolve the mixture in the user selected fluid.

**CLAIM 62.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of **CLAIM 20** comprising consisting essentially of the steps of:

placing the mixture in a filtration device such that a user selected fluid must pass through the filtration device and dissolve the mixture in the user selected fluid.

**CLAIM 63.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of **CLAIM 21** comprising consisting essentially of the steps of:

placing the mixture in a filtration device such that a user selected fluid must pass through the filtration device and dissolve the mixture in the user selected fluid.

**CLAIM 64.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of **CLAIM 31** comprising consisting essentially of the steps of:

placing the mixture in a filtration device such that a user selected fluid must pass through the filtration device and dissolve the mixture in the user selected fluid.

**CLAIM 65.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of **CLAIM 32** comprising consisting essentially of the steps of:

placing the mixture in a filtration device such that a user selected fluid must pass through the filtration device and dissolve the mixture in the user selected fluid.

**CLAIM 66.** (currently and previously amended) A method of using the disinfection and purification composition for producing potable fluids manufactured by the method of manufacture of **CLAIM 33** comprising consisting essentially of the steps of:

placing the mixture in a filtration device such that a user selected fluid must pass through the filtration device and dissolve the mixture in the user selected fluid.

**CLAIM 67.** (currently amended) A disinfection and purification composition consisting essentially of:

- (a) a user selected fluid;
- (b) at least one metal selected from the group consisting of the metals copper and silver wherein in the Periodic Table of the Elements, groups 1b, 2b, 3b, 4b, 5b, 6b, 7b, 8, 3a, 4a, and 5a; no more than 0.75 milligrams of copper and/or no more than 0.0375 milligrams of silver is dissolved in the user selected fluid per liter of the user selected fluid such that the concentration of the metal selected shall be no more than the United States Environmental Protection Agency's maximum concentration of contaminants for the metal selected;
- (c) ~~at least one plant no more than 110 milligrams of grapefruit seed extract dissolved in the user selected fluid per liter of the user selected fluid such that the concentration of the plant extract shall be no more than the United States Environmental Protection Agency's maximum concentration of contaminants for the plant extract; and~~
- (d) ~~at least one alcohol no more than 220 milligrams of glycerin dissolved in the user selected fluid per liter of the user selected fluid such that the concentration of the alcohol shall be no more than the United States Environmental Protection Agency's maximum concentration of contaminants for the alcohol.~~

**CLAIM 68.** (currently amended) A disinfection and purification composition consisting essentially of:

- (a) a user selected fluid;
- (b) at least one metal selected from the group consisting of the metals copper and silver wherein in the Periodic Table of the Elements, groups 1b, 2b, 3b, 4b, 5b, 6b, 7b, 8, 3a, 4a, and 5a; no more than 0.75 milligrams of copper and/or no more than 0.0375 milligrams of silver is dissolved in the user selected fluid per liter of the user selected fluid such that the concentration of the metal selected shall be no more than the United States Environmental Protection Agency's maximum concentration of contaminants for the metal selected; and
- (c) ~~at least one plant no more than 110 milligrams of grapefruit seed extract dissolved in the user selected fluid per liter of the user selected fluid such that the concentration of the plant extract shall be no more than the United States Environmental Protection Agency's maximum concentration of contaminants for the plant extract.~~

**CLAIM 69.** (currently amended) A disinfection and purification composition consisting essentially of:

- (a) a user selected fluid;

(b) ~~at least one metal selected from the group consisting of the metals copper and silver wherein in the Periodic Table of the Elements, groups 1b, 2b, 3b, 4b, 5b, 6b, 7b, 8, 3a, 4a, and 5a; no more than 0.75 milligrams of copper and/or no more than 0.0375 milligrams of silver is dissolved in the user selected fluid per liter of the user selected fluid such that the concentration of the metal selected shall be no more than the United States Environmental Protection Agency's maximum concentration of contaminants for the metal selected; and~~

(c) ~~at least one alcohol no more than 220 milligrams of glycerin dissolved in the user selected fluid per liter of the user selected fluid such that the concentration of the alcohol shall be no more than the United States Environmental Protection Agency's maximum concentration of contaminants for the alcohol.~~